

What is claimed is:

1. A balloon dilation catheter comprising:
a tubular member having a proximal end and a distal end;
an inflatable balloon disposed at the distal end of the tubular member;
a first lumen disposed in the tubular member and in communication with an interior of the inflatable balloon;
a second lumen disposed in the tubular member for receiving a guidewire substantially along its entire length, the second lumen having a first opening in the tubular member and a second opening at the distal end of the tubular member; and
a slit-forming region disposed longitudinally in the tubular member and extending along at least a portion of the tubular member, the slit-forming region causing formation of a first slit as the guidewire is separated from the second lumen.
2. The balloon dilation catheter defined in claim 1, wherein the slit-forming region extends from the first opening to an area on the tubular member which is proximal to the inflatable balloon.
3. The balloon dilation catheter defined in claim 1, wherein the slit-forming region extends from the first opening to the second opening.
4. The balloon dilation catheter defined in claim 1, wherein the inflatable balloon comprises a second slit in substantial alignment with the slit-forming region.
5. The balloon dilation catheter defined in claim 4, wherein at least a portion of the second slit is reinforced. 112912
6. The balloon dilation catheter defined in claim 1, further comprising a third lumen for receiving a stiffening member.

7. The balloon dilation catheter defined in claim 6, further comprising the stiffening member disposed in the third lumen.

8. The balloon dilation catheter defined in claim 6, wherein the third lumen at least partially encompasses the second lumen.

9. The balloon dilation catheter defined in claim 1, wherein the first lumen and the second lumen each comprise a passageway having a substantially circular cross-section disposed in a substantially solid tubular member.

10. The balloon dilation catheter defined in claim 1, wherein the slit-forming region extends along substantially the entire length of the tubular member.

11. The balloon dilation catheter defined in claim 1, wherein the slit-forming region extends along a portion of the length of the tubular member.

12. The balloon dilation catheter defined in claim 11, further comprising a third slit disposed in the tubular member.

13. The balloon dilation catheter defined in claim 12, wherein the third slit and the slit-forming region are in substantial longitudinal alignment.

14. The balloon dilation catheter defined in claim 12, wherein the third slit is disposed distally of the slit-forming region.

15. The balloon dilation catheter defined in claim 12, wherein the third slit is disposed proximally of the slit-forming region.

16. A catheterization kit comprising:
a guide catheter;
a guide wire; and
a balloon dilation catheter comprising: a tubular member having a proximal end and a distal end; an inflatable balloon disposed at the distal end of the tubular member; a first lumen disposed in the tubular member and in communication with an interior of the inflatable balloon; a second lumen disposed in the tubular member for receiving a guidewire substantially along its entire length, the second lumen having a first opening in the tubular member and a second opening at the distal end of the tubular member; and a slit-forming region disposed longitudinally in the tubular member and extending along at least a portion of the tubular member, the slit-forming region causing formation of a first slit as the guidewire is separated from the second lumen.

17. The catheterization kit defined in claim 16, wherein the slit-forming region extends from the first opening to an area on the tubular member which is proximal to the inflatable balloon.

18. The catheterization kit defined in claim 16, wherein the slit-forming region extends from the first opening to the second opening.

19. The catheterization kit defined in claim 16, wherein the inflatable balloon comprises a second slit in substantial alignment with the slit-forming region.

20. The catheterization kit defined in claim 19, wherein at least a portion of the second slit is reinforced.

21. The catheterization kit defined in claim 16, wherein the balloon dilation catheter further comprises a third lumen for receiving a stiffening member.

22. The catheterization kit defined in claim 21, further comprising the stiffening member disposed in the third lumen.

23. The catheterization kit defined in claim 21, wherein the third lumen at least partially encompasses the second lumen.

24. The catheterization kit defined in claim 16, wherein the first lumen and the second lumen each comprise a passageway having a substantially circular cross-section disposed in a substantially solid tubular member.

25. The catheterization kit defined in claim 16, wherein the slit-forming region extends along substantially the entire length of the tubular member.

26. The catheterization kit defined in claim 16, wherein the slit-forming region extends along a portion of the length of the tubular member.

27. The catheterization kit defined in claim 26, further comprising a third slit disposed in the tubular member.

28. The catheterization kit defined in claim 27, wherein the third slit and the slit-forming region are in substantial longitudinal alignment.

29. The catheterization kit defined in claim 27, wherein the third slit is disposed distally of the slit-forming region.

30. The catheterization kit defined in claim 27, wherein the third slit is disposed proximally of the slit-forming region.

31. A stent-mounted balloon catheter comprising:

38. The balloon catheter defined in claim 36, wherein the third lumen at least partially encompasses the second lumen.

39. The balloon catheter defined in claim 31, wherein the first lumen and the second lumen each comprise a passageway having a substantially circular cross-section disposed in a substantially solid tubular member.

40. The balloon catheter defined in claim 31, wherein the slit-forming region extends along substantially the entire length of the tubular member.

41. The balloon catheter defined in claim 31, wherein the slit-forming region extends along a portion of the length of the tubular member.

42. The balloon catheter defined in claim 41, further comprising a third slit disposed in the tubular member.

43. The balloon catheter defined in claim 42, wherein the third slit and the slit-forming region are in substantial longitudinal alignment.

44. The balloon catheter defined in claim 42, wherein the third slit is disposed distally of the slit-forming region.

45. The balloon catheter defined in claim 42, wherein the third slit is disposed proximally of the slit-forming region.